Tom.Perina@CH2M.com
05/31/2005 09:48 AM

To Christopher Lichens/R9/USEPA/US@EPA
cc
bcc
Subject SSD and OSS memos

Chris,

attached are draft memos addressing the OPOG/CDM response to the review comments on the SSD and OSS Work Plans. Please call me to discuss after you have had the time to review. Specifically, let me know if you want to modify the first comment in the OSS memo.

Tom  Review of CDM Responses to EPA OSS WP Add 2 Comments 052905.pdf


Review of CDM Responses to EPA SSD Workplan Comments 05_29_05-R2.pdf

MEMORANDUM **CH2MHILL**

Review Comments on "Response to EPA Comments on On-Site Soils RI/FS Work Plan Addendum No. 2 Scope of Work for Additional Investigation Omega Chemical Superfund Site," Dated April 29, 2005, Prepared by Camp Dresser & McKee, Inc.

TO: Christopher Lichens/USEPA Region IX

FROM: Tom Perina/CH2M HILL, Riverside
Mike Grigorieff/CH2M HILL, Santa Ana

DATE: May 29, 2005

As you requested, CH2M HILL reviewed the memorandum prepared by Camp Dresser & McKee, Inc. (CDM), dated April 29, 2005, and titled *Response to EPA Comments on On-Site Soils RI/FS Work Plan Addendum No. 2 Scope of Work for Additional Investigation Omega Chemical Superfund Site.* CDM prepared the subject document on behalf of the Omega Chemical Site PRP Organized Group (OPOG). The subject memorandum presents OPOG/CDM's responses to review comments made by EPA/CH2M HILL on the initially submitted workplan.

Consistent with the oversight role of the U.S. Environmental Protection Agency (EPA), this technical memorandum presents recommendations and comments that CH2M HILL believes will streamline and improve the project. The goal of this review is to confirm that the approach to the investigation is appropriate and consistent with the goals at this site and is consistent with typical industry practices.

In the section below, original EPA comments and CDM's responses for which we still have additional comments were excerpted directly from CDM's memorandum and "pasted" into this memo. Our review comments are provided below these excerpts and are shown in underlined, bold, italicized font.

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4. Section 2.0, Objectives. As indicated in the Consent Decree (see Attachment 1), objectives should include characterization of the extent of contamination resulting from the Omega Site.

OPOG understands and does not take issue with the requirements of the Consent Decree as stated, however, we do not believe that characterizing the extent of contamination associated with the Omega site is appropriately included as an objective of this phase of data collection. As we discussed in our April 20 meeting with EPA, OPOG intends to fully comply with the CD requirements; however, delineation of the extent of contamination prior to source characterization is premature. This phase of data collection is being undertaken primarily for the purpose of attempting to identify and characterize the source of contamination on the Omega Site.

COMMENT: Please state any non-technical reasons for limiting the investigation to within the Phase 1a Area. The response implies that this phase of investigation will be followed by additional phases. While we agree that a phased investigation approach is appropriate in general, it is neither necessary nor effective at present. There is sufficient information for conducting an investigation to characterize the extent of the soil contamination associated with the Omega property. The investigation OPOG/CDM conducted in 2003 was limited in scope and did not sufficiently characterize the distribution of the contamination at the property or the extent of the contamination. The proposed investigation will also provide only partial results. Such pace of investigations results in slow progress toward completing the RI and increases EPA's oversight costs. We request that this phase of the investigation cover the characterization of the source area(s) at the former Omega property and the extent of the soil contamination (lateral and vertical) as well. There is no need to prepare additional work plan addenda; Addendum No. 2 should present only the rationale for off-site sampling and the specific sampling locations can be discussed in conference calls later. See also Comment 11.

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6. Section 3.1, Geologic Framework, second paragraph. The thin sandy unit referred to as a stringer is not shown on the boring log for GP-2 or on cross-section A-A'. According to the text, this unit should correspond to the SP unit found at a depth of 56 feet at GP-1. It seems that this unit is not present at GP-2 or was not noticed during logging. The text should be revised to reconcile this.

The text as presented is correct. The cross-sections show the dominant lithology. The noted stringer occurs as sand or sand and gravel within a predominant silt or clay matrix. The cross-sections by necessity simplify the lithology to the dominant lithology logged. The intervals referenced are as follows:

GP-1 77 – 78.5 feet bgs - ML Silt with gravel, 60% silt, 25% gravel, 15% sand

GP-2 78.5 – 79.5 feet bgs - CL clay with sand, 70% clay, 20% sand, 10% silt

GP-3A 78 – 79 feet bgs - CL clay with sand 60% clay, 30%sand, 10% silt

COMMENT: The comment refers to the depth of 56 feet at GP-1 while the response refers to depths of 77-79 feet. Please address the comment. Also, the lithologies described in the excerpt above indicate predominantly clayey and silty soils; consequently, such stringer is not expected to act as a conduit for contaminant transport. While it is important to

correlate stratigraphic units to understand the depositional setting, lithostratigraphic units are far more important for the Removal Action (RA).

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7. Section 3.2, Contaminant Distributions. The speculative statement about other sources of Freons in the second paragraph should be supported by evidence or deleted.
This statement is fully supported and is not "speculative". Freon manufacturing occurred on the adjacent parcel for a number of years and existing vapor data demonstrate a higher percentage of freons on this adjacent parcel. Consequently, it is reasonable to conclude based upon the data and information that off-site sources may exist. As noted in the response to Comment 13 below, vapor probes SV-1, SV-2 and SV-3 will address this issue.

COMMENT: Please include specific information on freons at the adjacent property.

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The following comment was also noted:

1. **Table 7-1, Summary of Data Quality Objectives for Addendum No. 2 to On-Site Soils RI/FS Work Plan**. Step 1, Statement of Problem, Sentence #3: "A soils RI/FS and risk assessment are being prepared to evaluate the nature and extent of contamination in soils and the potential threat to human health and to identify remedial alternatives." The previous sentence states that "These chemicals could potentially have an adverse effect upon human health and the environment". For completeness, Sentence #3 should be revised to read: "A soils RI/FS and risk assessment are being prepared to evaluate the nature and extent of contamination in soils and the potential threat to human health *and the environment* and to identify remedial alternatives."

   Step 5, Decision Rules, Sentence #1: "If chemical concentrations in soil, indoor air, ambient air, and soil gas do not pose a risk to human health, then recommend no further action." For completeness, Sentence # 1 should be revised to read: "If chemical concentrations in soil, indoor air, ambient air, and soil gas do not pose a risk to human health *or the environment*, then recommend no further action."

   Step 5, Decision Rules, Sentence #3: "If chemicals in soil, indoor air, ambient air, or soil gas at the Site pose a risk to human health, the following will take place." For completeness, Sentence # 3 should be revised to read: "If chemicals in soil, indoor air, ambient air, or soil gas at the Site pose a risk to human health *or the environment*, the following will take place."